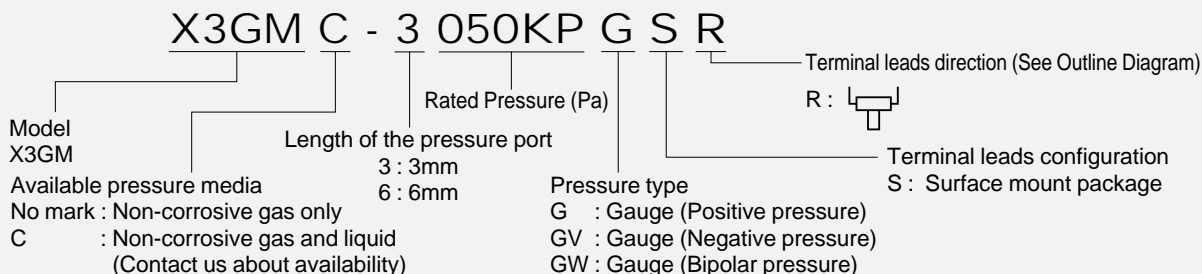


## Features

- 3V excitation, Battery operation available
- Volt level output
- On-chip amplification and temperature compensations
- Pre-calibration of offset voltage and span
- Non-corrosive liquid measurable (X3GMC only)

## Part number for ordering



Pressure type	Gauge pressure	
	X3GM-3	X3GM-6
Model		
Package configuration	Surface mount package, 3mm pressure port	Surface mount package, 6mm pressure port

Measurable pressure range (kPa)	Part number for ordering	
-100~100	X3GM-3100KPGWSR	X3GM-6100KPGWSR
0~-100	X3GM-3100KPGVSR	X3GM-6100KPGVSR
0~50	X3GM-3050KPGSR	X3GM-6050KPGSR
0~100	X3GM-3100KPGSR	X3GM-6100KPGSR
0~200	X3GM-3200KPGSR	X3GM-6200KPGSR
0~1000	X3GM-3001MPGSR	X3GM-6001MPGSR

## Specifications

Model/Rated pressure	100KPGW	100KPGV	050KPG	100KPG	200KPG	001MPG	Unit
<b>Recommended operating conditions</b>							
Pressure type	Gauge pressure						—
Rated pressure	±100	-100	50	100	200	1000	kPa
	±1.020	-1.020	0.510	1.020	2.040	10.20	kg/cm <sup>2</sup>
Measurable pressure range	-100~100	0~-100	0~50	0~100	0~200	0~1000	kPa
Pressure media ※1	XFGM : Non-corrosive gas only, XFGMC : Non-corrosive gas and liquid						—
Excitation voltage	3.0±0.15						VDC
<b>Absolute maximum rating</b>							
Maximum load pressure	Twice of rated pressure					1.5times of rated pressure	—
Maximum excitation voltage	6						VDC
Operating temperature	-10~80						°C
Storage temperature	-20~100						°C
Operating humidity	30~80 (No dew condensation)						%RH
<b>Electric performances/characteristics (Excitation voltage Vcc=3.0V constant, Ambient temperature Ta=25°C)</b>							
Current consumption	less than 6						mA
Output impedance	less than 10						Ω
Source current	less than 0.1						mA
Sink current	less than 1						mA
Mechanical response time	2 (For the reference)						msec
Full scale span voltage	1.5						V
Offset voltage※1.2	0.5±0.075						V
Full scale span voltage※1.2	2.0±0.075						V
Accuracy※1.2	±5.0						%FS/0~50°C

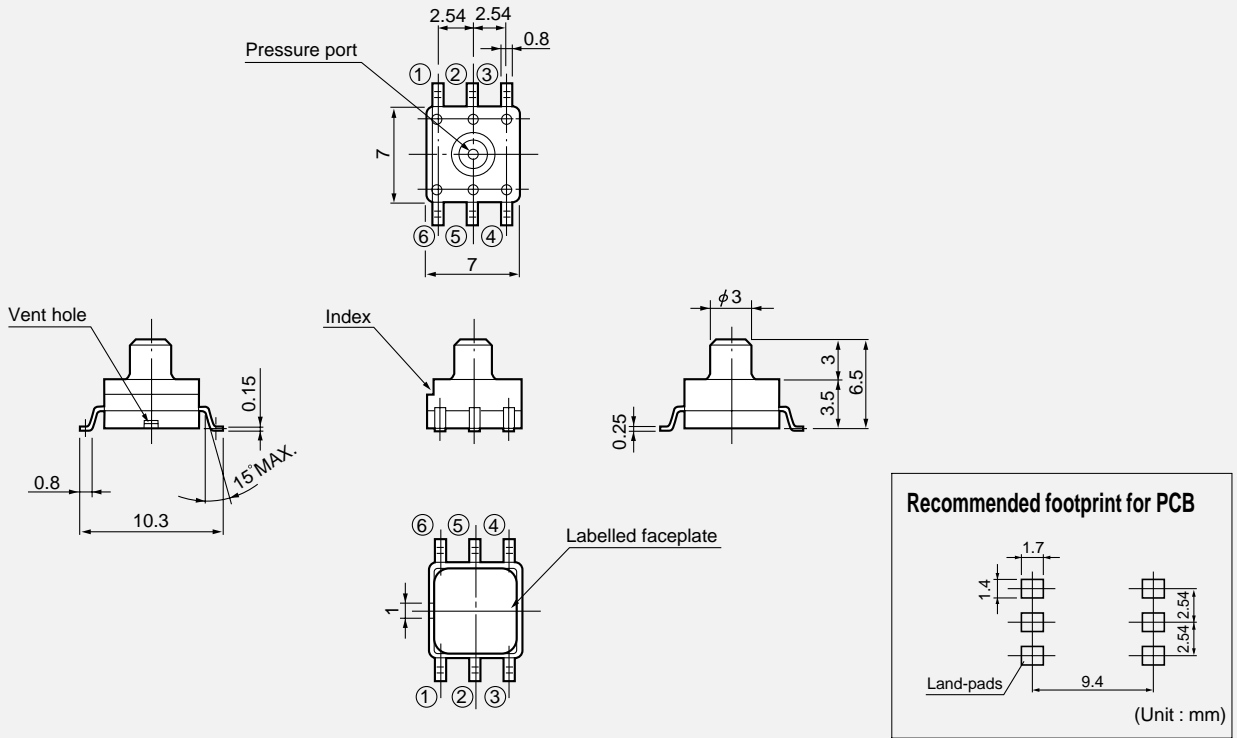
Note ; ※1) Please consult us available when you choose the C models.

※2) Excluding input voltage error.

■ Outline dimensions ■

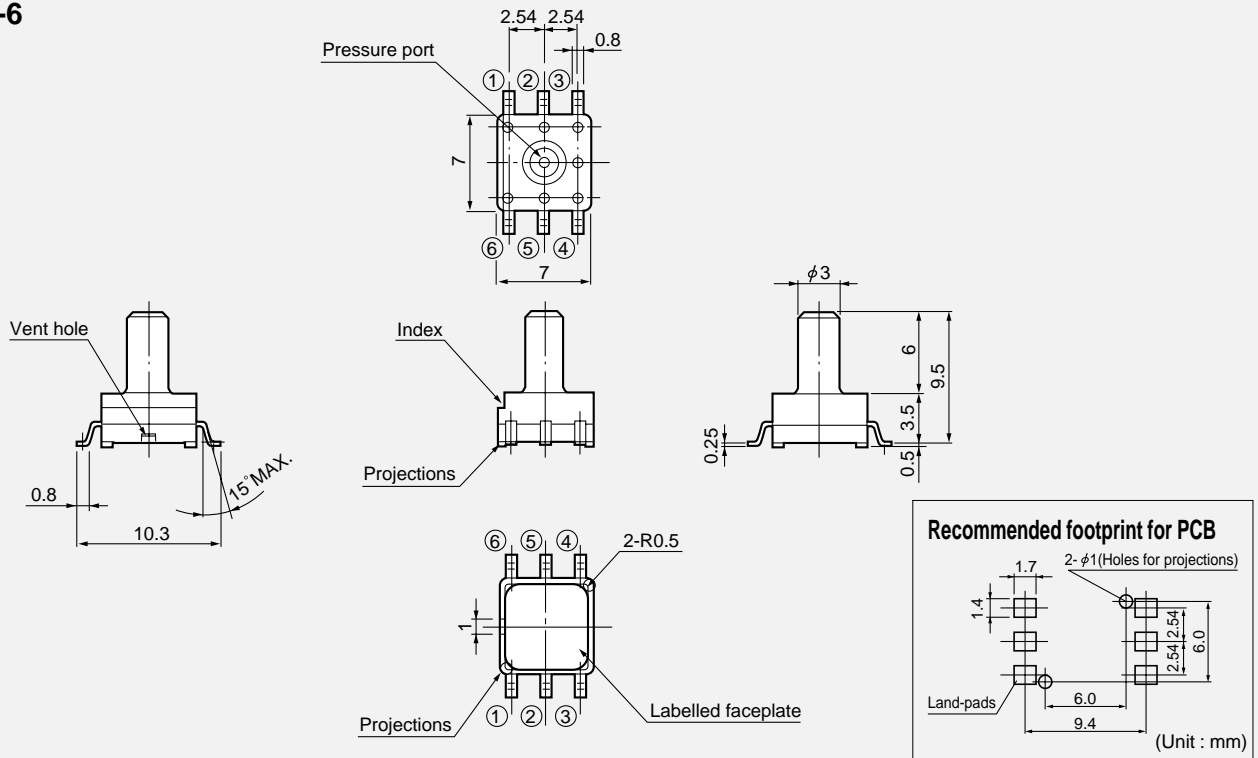
Unit : mm

X3GM-3

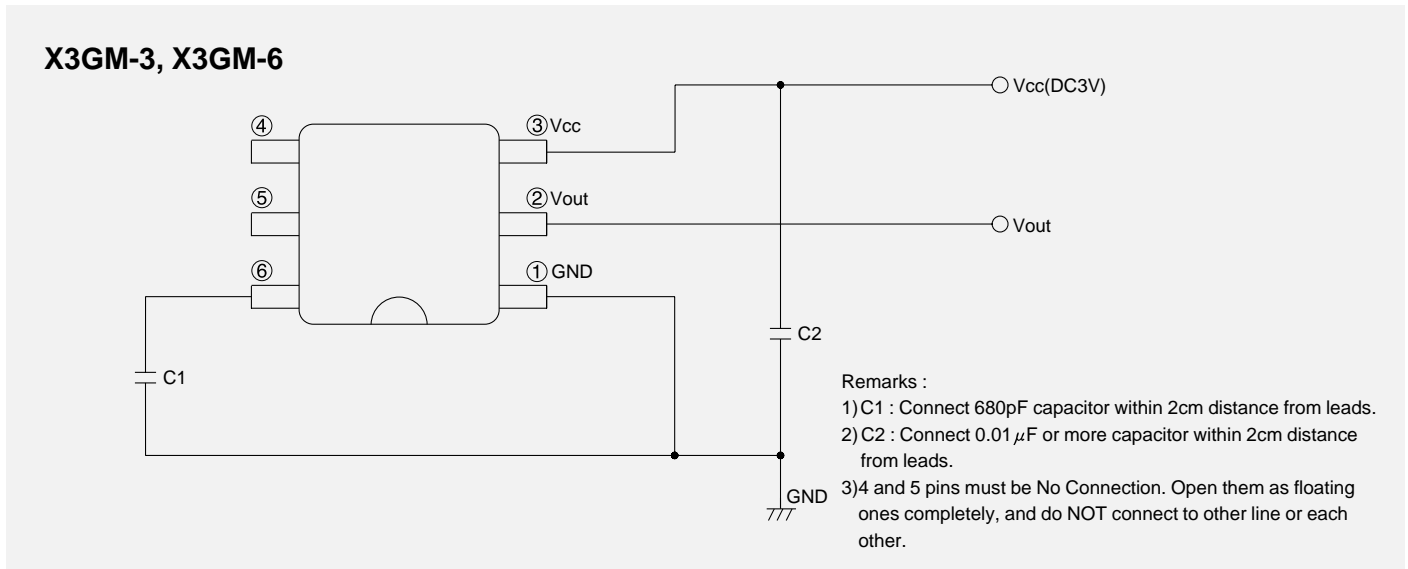


Unit : mm

X3GM-6



## ■ Connection diagram ■



## ■ Transfer Function ■

$$V_{out} = V_s \times (P \times \alpha + \beta) \pm (\text{Pressure Error} \times \text{Temperature Error Multiplier} \times \alpha \times V_s)$$

※ $V_s = 3.0$ volts

Notes ; The output voltage (Vout) is no perfect ratiometric with the power supply voltage.

※ $P = \text{Input Pressure (kPa)}$

Model	pressure range	$\alpha$	$\beta$	Pressure Error(kPa)
050KPG(D)	0~50kPa	0.01	0.1667	2.5
100KPG(D)	0~100kPa	0.005	0.1667	5.0
100KPGV	0~-100kPa	-0.005	0.1667	5.0
100KPGW(DW)	-100~+100kPa	0.0025	0.4167	10.0
200KPG(D)	0~200kPa	0.0025	0.1667	10.0
001MPG(D)	0~1MPa	0.0005	0.1667	50.0
115KPA	15~115kPa.abs	0.005	0.09167	5.0

※Temperature Error Multiplier=1

Note ; Please read instruction "Notes" before using the sensor.  
Fujikura reserves the right to change specifications without notice.

# Fujikura Ltd.

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